

312 Amendment has been considered.

Please ENTER,

Thanks,

/Lin Liu/

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PATENT

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Application No.: 10/648,506

Notice of Allowance Dated: December 30, 2009

This listing of claims will replace all prior versions, and listings, of claims in the application.

Listing of Claims:

1. (Previously Presented) A method comprising:

classifying actions associated with first and second service entities, the first service entity being associated with a first application service and the second service entity being associated with a second application service different from the first application service, the first service entity of the first application service having first metadata attributes associated therewith and the second service entity of the second application service having second metadata attributes associated therewith, the first metadata attributes describing a format of data of the first service entity and actions available to be performed on the first service entity, and the second metadata attributes describing a format of data of the second service entity and actions available to be performed on the second service entity, the first metadata attributes of the first service entity being different from the second metadata attributes of the second service entity, wherein each action is classified according to its availability, wherein classifying an action comprises classifying an action as available according to a rule comprising at least one of a maximum number of times which an action can be performed, a time period in which an action must be performed, a user or class of users which must perform an action, a condition which must occur before performance of an action, or a condition which must occur after performance of an action;

running a context service that matches the first and second service entities despite the different first and second metadata attributes thereof, the context service matching the first and second entities by cross-referencing the first and second metadata attributes thereof to identify actual and/or potential relationships, the context service upon matching the first and second service entities consolidating the matching first and second service entities into a single consolidated context entity and consolidating the first and second metadata attributes into a single consolidated set of metadata attributes describing a

format of data of the single consolidated context entity and actions available to be performed on the single consolidated context entity;

determining with reference to the consolidated set of metadata attributes that an action is available to be performed based on a corresponding classification of the availability of the action for each of the matched first and second service entities; and

displaying the action available to be performed.

2. (Original) The method of claim 1, wherein classifying the actions comprises classifying the actions as optimistically available.
3. (Original) The method of claim 2, wherein classifying the actions as optimistically available comprises classifying the actions as available subject to a rule.
4. (Canceled)
5. (Original) The method of claim 1, wherein classifying the actions as available according to a rule comprises classifying the actions as being available only if the rule is complied with.
6. (Original) The method of claim 1, wherein the classifying the actions comprises classifying the actions as universally available.
7. (Previously Presented) The method of claim 1, wherein determining if an action is available comprises determining if performance of the action will result in a conflict.
8. (Previously Presented) The method of claim 1, further comprising consolidating the first and second service entities into a context entity and matching an application entity to the context entity.

9. (Previously Presented) The method of claim 8, further comprising providing a view at an application of the actions available to be performed on each of the first and second service entities at the application services.

10. (Previously Presented) A method for providing to an application an action available to be performed on a first service entity at a first application service, the method comprising:

running a context service that matches a second service entity to an associated context entity derived from the first service entity, the first service entity being associated with a first application service and the second service entity being associated with a second application service different from the first application service, the first service entity of the first application service having first metadata attributes associated therewith and the second service entity of the second application service having second metadata attributes associated therewith, the first metadata attributes describing a format of data of the first service entity and actions available to be performed on the first service entity, wherein determining if the action is available to be performed on the first service entity is based on a classification that the action is available according to a rule comprising at least one of a maximum number of times which an action can be performed, a time period in which an action must be performed, a user or class of users which must perform an action, a condition which must occur before performance of an action, or a condition which must occur after performance of an action, and the second metadata attributes describing a format of data of the second service entity and actions available to be performed on the second service entity, the first metadata attributes of the first service entity being different from the second metadata attributes of the second service entity, the matching of the first and second service entities being performed despite the different first and second metadata attributes thereof, the first service entity being extensible markup language data associated with the first application service and the second service entity being extensible markup language data associated with the second application service, wherein the first application service is connected via a network to the second application service, the

context service matching the first and second entities by cross-referencing the first and second metadata attributes thereof to identify actual and/or potential relationships, the context service upon matching the first and second service entities consolidating the matching first and second service entities into a single consolidated context entity and consolidating the first and second metadata attributes into a single consolidated set of metadata attributes describing a format of data of the single consolidated context entity and actions available to be performed on the single consolidated context entity; identifying that the associated context entity is derived from the first service entity; in response to a selection of the first service entity, determining with reference to the consolidated set of metadata attributes that an action is available to be performed on the matched first service entity at the first application service based on a classification of the action according to its availability; and displaying the action available to be performed.

11. (Currently Amended) The method of claim 10, comprising identifying that the associated context entity is derived from the first service entity and [[a]] the second service entity at [[a]] the second application service, the first service entity being related to the second service entity.
12. (Original) The method of claim 10, comprising determining if the action is available to be performed on the first service entity at the first application service based on a classification that the action is optimistically available.
13. (Original) The method of claim 12, comprising determining if the action is available to be performed on the first service entity at the first application service based on a classification that the action is available subject to a rule.
14. (Canceled)

15. (Previously Presented) The method of claim 10, comprising determining if the action is available to be performed on the first service entity at the first application service based on a classification that the action is available only if the rule is complied with.

16. (Original) The method of claim 10, comprising determining if the action is available to be performed on the first service entity at the first application service on a classification that the action is universally available.

17. (Original) The method of claim 10, wherein determining if the action is available to be performed on the first service entity comprises determining if performance of the action on the first service entity will result in a conflict .

18. (Original) The method of claim 10, further comprising generating a view of the action at the application.

19. (Currently Amended) A system for determining if a first action and a second action are available to be performed in connection with a computer-implemented context entity, the computer-implemented context entity derived from a first service entity at a first application service, wherein determining if the action is available to be performed on the first service entity is based on a classification that the action is available according to a rule comprising at least one of a maximum number of times which an action can be performed, a time period in which an action must be performed, a user or class of users which must perform an action, a condition which must occur before performance of an action, or a condition which must occur after performance of an action, and a second service entity at a second application service, the first service entity being related to the second service entity, the first service entity of the first application service having first metadata attributes associated therewith and the second service entity of the second application service having second metadata attributes associated therewith, the first metadata attributes describing a format of data of the first service entity and actions available to be performed on the first service entity, and the second metadata attributes

describing a format of data of the second service entity and actions available to be performed on the second ~~first~~ service entity, the first metadata attributes of the first service entity being different from the second metadata attributes of the second service entity, the system comprising:

the first application service, said first application service classifying the first action and providing the classification of the first action to an action service, the first action classified according to its availability to be performed on the first service entity at the first application service;

the second application service, said second application service classifying the second action and providing the classification of the second action to the ~~an~~ action service, the second action classified according to its availability to be performed on the second service entity at the second application service;

the action service, said action service determining if the first action and the second action are available based on the classification of the first action the classification of the second action; and

a ~~the~~ context service, said context service matching the first and the second service entities despite the different first and second metadata attributes thereof, consolidating the first and the second service entities into the computer-implemented context entity, and querying the action service to determine that the first action is available and the second action is available for each of the matched first and second service entities, the context service matching the first and second entities by cross-referencing the first and second metadata attributes thereof to identify actual and/or potential relationships, the context service upon matching the first and second service entities consolidating the matching first and second service entities into the computer-implemented context entity as a single consolidated context entity and consolidating the first and second metadata attributes into a single consolidated set of metadata attributes describing a format of data of the single consolidated context entity and actions available to be performed on the single

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consolidated context entity, the action service determining if the first action and the second action are available with reference to the consolidated set of metadata attributes.

20. (Original) The system of claim 19, wherein said action service comprises a conflict protection mechanism to determine if performance of the first and the second action will result in a conflict.
21. (Original) The system of claim 19, wherein said action service comprises a tracking mechanism to track performance of the first and the second actions.
22. (Original) The system of claim 19, further comprising an application, said application managing an application entity that is matched to the context entity.
23. (Original) The system of claim 22, wherein said application comprises a state and relationship view mechanism for displaying a view of the first and the second actions.